West Virginia Department of Environmental Protection Division of Air Quality

Fact Sheet



For Final Significant Modification Permitting Action Under 45CSR30 and Title V of the Clean Air Act

This Fact Sheet serves to address the changes specific to this Significant Modification, and shall be considered a supplement to the Fact Sheet corresponding with the Title V operating permit issued on January 3, 2018.

Permit Number: **R30-04100013-2018**Application Received: **November 24, 2020**Plant Identification Number: **03-54-04100013**

Permittee: Eastern Gas Transmission and Storage, Inc.

Facility Name: Lightburn Station

Mailing Address: 925 White Oaks Blvd., Bridgeport, WV 26330

Permit Action Number: SM01 Revised: September 14, 2021

Physical Location: Jane Lew, Lewis County, West Virginia

UTM Coordinates: 547.54 km Easting • 4,331.11 km Northing • Zone 17

Directions: From Charleston, take I-79N to Jane Lew. Take Exit 105 (Jane Lew Exit) and

make a left on County Road 7 (Berkin-Jane Lew Road). Stay on CR-7 until it intersects Route 19 (Main Avenue). Make a right on Route 19 and make the immediate left on Broad Run Road. Stay on Broad Run Road until it intersects County Road 1 (Old Mill Road/Fork River Road/Jackson Mill Road) and make a right. Stay on CR-1 for about 500 yards and Lightburn Station is on the right.

Facility Description

The Lightburn Station consists of a natural gas extraction plant, Lightburn Extraction Plant (LEP), and a compressor station, Lightburn Compressor Station (LCS). LEP is located adjacent to LCS. The LEP and LCS are located on contiguous property and are under common control. However, the plants do not belong to the same industrial grouping (SIC). The LCS operates under SIC Code 4922 (Pipeline Transmission of Natural Gas), and the LEP operates under SIC Code 1321 (Natural Gas Liquid Extraction).

<u>Lightburn Compressor Station (LCS)</u>

The emission units at LCS consist of two (2) 2,000 HP natural gas fired reciprocating engines (EN01, EN02), three (3) 4,000 HP natural gas fired reciprocating engines (EN03, EN04, EN05), two (2) 6,060 HP natural gas fired reciprocating engines (EN06 (6), EN07 (7)), one (1) 1,085 HP auxiliary generator (AUX02 (11)), two (2) dehydration unit stills (DEHY01, DEHY02), two (2) boilers (BLR01, BLR02 (14)), one (1) heater (HTR01), two (2) reboilers (RBR01, RBR02 (13)), two (2) dehydration unit flares (F1, F2), and twenty six(26) tanks of various sizes.

Lightburn Extraction Plant (LEP)

The emission units at LEP consist of two (2) 3,550 HP natural gas fired reciprocating engines (EN08, EN09), two (2) 216 HP fire pump engines (EN10, EN11), four (4) 60,000-gallon aboveground natural gas liquid storage tanks (008-01, 008-02, 008-03, 008-04), two (2) natural gas liquid loading racks (009-01, 009-02), one (1) emergency and maintenance flare (FLARE3), two (2) 290-gallon aboveground diesel fuel storage tanks (014-01, 014-02), one (1) 500-gal methanol storage tank, one (1) 254 HP emergency generator (012-01), twelve (12) tanks of various sizes, one (1) 1,400-gal intermediate pressure vessel, and blowdown and pigging operations. The natural gas capacity of the LEP is 52 MMSCFD, and the plant is estimated to produce 2,244 barrels/day of natural gas liquids. The LEP receives natural gas from the existing Kennedy Compressor Station and Wymer Junction.

This modification is to address Consent Order CO-R13, 30-E-2020-08 which required the permittee to do the following:

- Clarify the description of Process Tank TK-2580 and associated pressure relief device (PRD), to address continuous venting of process gas from the PRD and TK-2580 access hatches observed by DAQ.
- Add facility-wide blowdowns and pigging VOC/HAP emissions from both the extraction plant and adjacent transmission compressor station.
- Revise the maximum FLARE3 waste gas throughput and associated potential emissions as a result
 of the increase.
- Revise the FLARE3 allowable maximum exit velocity to include the air-assist blower.
- Revise glycol pump rates and flares F1 and F2 maximum gas throughput for dehydration units DEHY01 and DEHY02.
- Revise the fugitive VOC/HAP emissions to reflect the correct service category (gas, light liquid, VOC content, etc.).

Emissions Summary

This modification results in the following emission changes:

Pollutant	PTE Change (tons/year)
Nitrogen Oxides	+2.60
Carbon Monoxide	+2.20
Volatile Organic Compounds	+0.14
Particulate Matter (PM ₁₀)	+0.20
Sulfur Dioxide	0
Total HAPs	0

Title V Program Applicability Basis

With the proposed changes associated with this modification, this facility maintains the potential to emit 1,089.40 tons per year of Carbon Monoxide; 2,500.57 tons per year of Nitrogen Oxides; 542.48 tons per year of Volatile Organic Compounds; 51.06 tons per year of Formaldehyde; and 71.0 tons per year of aggregate Hazardous Air Pollutants. Due to this facility's potential to emit over 100 tons per year of criteria pollutant, over 10 tons per year of a single HAP, and over 25 tons per year of aggregate HAPs, Eastern Gas Transmission and Storage, Inc. is required to have an operating permit pursuant to Title V of the Federal Clean Air Act as amended and 45CSR30.

Legal and Factual Basis for Permit Conditions

The State and Federally-enforceable conditions of the Title V Operating Permits are based upon the requirements of the State of West Virginia Operating Permit Rule 45CSR30 for the purposes of Title V of the Federal Clean Air Act and the underlying applicable requirements in other state and federal rules.

The modification to this facility has been found to be subject to the following applicable rules:

Federal and State: 45CSR6 Open burning prohibited.

45CSR13 Permits for Construction, Modification,

Relocation and Operation of Stationary

Sources

45CSR30 Operating permit requirement.

State Only: None.

Each State and Federally-enforceable condition of the Title V Operating Permit references the specific relevant requirements of 45CSR30 or the applicable requirement upon which it is based. Any condition of the Title V permit that is enforceable by the State but is not Federally-enforceable is identified in the Title V permit as such.

The Secretary's authority to require standards under 40 C.F.R. Part 60 (NSPS), 40 C.F.R. Part 61 (NESHAPs), and 40 C.F.R. Part 63 (NESHAPs MACT) is provided in West Virginia Code §§ 22-5-1 *et seq.*, 45CSR16, 45CSR34 and 45CSR30.

Active Permits/Consent Orders

The active permits/consent orders affected by this modification are as follows:

Permit or Consent Order Number	Date of Issuance	Permit Determinations or Amendments That Affect the Permit (if any)
R13-2823F	June 2, 2021	
CO-R13, 30-E-2020-08	September 28, 2020	

Conditions from this facility's Rule 13 permit(s) governing construction-related specifications and timing requirements will not be included in the Title V Operating Permit but will remain independently enforceable under the applicable Rule 13 permit(s). All other conditions from this facility's Rule 13 permit(s) governing the source's operation and compliance have been incorporated into this Title V permit in accordance with the "General Requirement Comparison Table," which may be downloaded from DAQ's website.

Determinations and Justifications

The following changes, approved under R13-2823F were made as part of this minor modification:

Company name has changed from Dominion Energy Transmission, Inc. to Eastern Gas Transmission and Storage, Inc.

1.1 Emission Units

• Added emission unit 014-03 (Methanol Storage Tank) to the Lightburn Extraction Plant section of the table. This emission unit had previously been left out of the Title V permit.

• The following emission units were added to the facility as part of R13-2823F: Wastewater Tank (TK-2580), Intermediate Pressure Tank (VP-2700), and Blowdown and Pigging Operations (BPO).

3.0 Facility-Wide Requirements

Added condition 3.1.10 to limit emission units/sources authorized at the permitted facility.

5.0 Source-Specific Requirements: Lightburn Compressor Station [F1, F2, DEHY01, DEHY02]

- Added condition 5.1.15 to set maximum inlet gas throughputs for F1 and F2.
- Added condition 5.1.16 with emission limits for F1 and F2.
- Added condition 5.2.8 to monitor throughput of each enclosed flare (F1 and F2) monthly.
- Added recordkeeping requirements for F1 and F2 as conditions 5.4.3, 5.4.4, and 5.4.5.

<u>8.0 Source-Specific Requirements: Lightburn Extraction Plant [Tanks: 008-01, 008-02, 008-03, 008-04, TK-2580, V-2700]</u>

• Added condition 8.1.2 for wastewater tank (TK-2580) and intermediate pressure vessel (V-2700).

9.0 Source-Specific Requirements: Lightburn Extraction Plant [Non-fractionating Process Plant]

• Added condition 9.1.20 requiring the permittee to keep an accurate plant component count in relation to 40CFR60 Subpart KKK.

11.0 Source-Specific Requirements: Lightburn Extraction Plant [Flare Control Device: FLARE3]

- Added condition 11.1.2. to limit waste gas throughput of FLARE3
- Incorporated the new FLARE 3 emission limits from R13-2823F in condition 11.1.3.
- Added condition 11.1.5 requiring an air assisted blower and limiting the maximum allowable exit velocity for FLARE3.
- Updated condition numbers, condition references and citations affected by the addition of conditions 11.1.2. and 11.1.5. This includes conditions 11.1.3 11.1.9, 11.2.1, 11.2.2, 11.3.1, 11.3.2, 11.4.1 11.4.3, 11.4.5, and 11.5.3.

12.0 Source-Specific Requirements: Lightburn Extraction Plant [Blowdowns and Pigging Operations]

 Section 12.0 was added to incorporate the blowdown and pigging event requirements that were added as part of R13-2823F.

Non-Applicability Determinations

The following requirements have been determined not to be applicable to the subject facility due to the following:

None.

Request for Variances or Alternatives

None.

Insignificant Activities

Insignificant emission unit(s) and activities are identified in the Title V application.

Comment Period

Beginning Date: July 28, 2021 Ending Date: August 27, 2021

Point of Contact

All written comments should be addressed to the following individual and office:

Robert Mullins
West Virginia Department of Environmental Protection
Division of Air Quality
601 57th Street SE
Charleston, WV 25304
304/926-0499 ext. 41286
Robert.A.Mullins@wv.gov

Procedure for Requesting Public Hearing

During the public comment period, any interested person may submit written comments on the draft permit and may request a public hearing, if no public hearing has already been scheduled. A request for public hearing shall be in writing and shall state the nature of the issues proposed to be raised in the hearing. The Secretary shall grant such a request for a hearing if he/she concludes that a public hearing is appropriate. Any public hearing shall be held in the general area in which the facility is located.

Response to Comments (Statement of Basis)

Not applicable.